DA FOREST SERVICE
SOURCE BULLETIN NC-32

VENEER-LOG PRODUCTION AND RECEIPTS, NORTH CENTRAL REGION 1974

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NORTH CENTRAL FOREST EXPERIMENT STATION
FOREST SERVICE • U.S. DEPARTMENT OF AGRICULTURE

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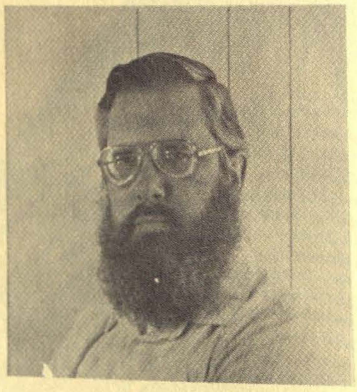

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1976

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This report of 1974 veneer-log production and receipts[1] in the North Central Region is divided into two sections--Lake States (Minnesota, Wisconsin, and Michigan) and Central States (Indiana, Illinois, Iowa, and Missouri)--because different species are grown and used as veneer logs in each area. Moreover, less information can be released about the Central States because more detailed data would reveal the operations of individual mills. Export data are reported for Canada but not for other countries.

All but one veneer mill using North Central Region timber in 1974 reported their veneer-log receipts by species and State of origin. Their cooperation is gratefully acknowledged. Receipts were estimated for the nonresponding mill. Statistics for one large mill are not included in this report to avoid disclosure of its operations (fig. 1); data for the other large mill previously excluded are now included.

Of the 58 active veneer mills in the Region in 1974, 40 were standard[2] veneer mills and 18 were container[3] veneer mills. From 1972 to 1974, one standard veneer mill and one container veneer mill closed; three standard veneer mills began operations.

LAKE STATES

Production

Lake States loggers harvested 68.7 million board feet of veneer logs in 1974. Five species comprised 84 percent of the total volume:

Species	*Thousand board feet*
Aspen	24.3
Hard maple	11.7
Red oak	11.1
Elm	6.2
Yellow birch	4.2

Most of the harvest (64.1 million board feet) was standard veneer logs; the remainder was container veneer logs.

Hard maple regained its position ahead of red oak as a veneer species (fig. 2). Excluding aspen, the major changes in veneer log production between 1972 and 1974 were:

Species	*Thousand board feet*	*Percent*
Hard maple	+2,451	+26
Red oak	+1,404	+14
Elm	+1,061	+21
Yellow birch	-1,015	-20
Soft maple	+976	+94

The long-term downtrend in the yellow birch harvest continued in 1974.

Wisconsin produced 37.3 million board feet of logs. Aspen and red oak were the principal species cut. The elm harvest rose 1.3 million board feet from 1972, probably because Dutch Elm Disease was spreading rapidly through Wisconsin and many high quality logs were being salvaged from infected trees. Walnut and red oak were the primary species shipped outside the Lake States from Wisconsin.

Michigan cut 25.9 million board feet of veneer logs, principally from aspen, hard maple, and yellow birch. The elm harvest dropped below one-half million board feet,

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[1] *Production is the volume of veneer logs cut from a specific area; receipts are the volume of veneer logs received by mills in a specific area regardless of geographic source.*

[2] *Commercial, face, and specialty veneer mills that manufacture veneer used in doorskins, furniture, wall panels, specialty plywood, and similar items.*

[3] *Mills that manufacture veneers used in boxes, crates, packing cases, and other wood veneer containers.*

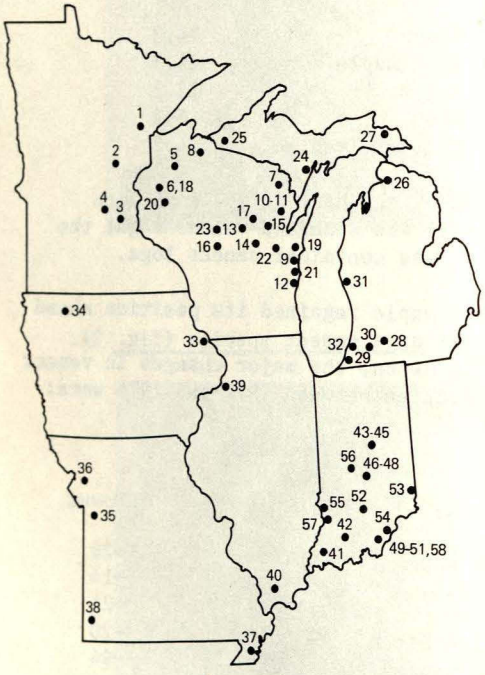

Figure 1.--*Location of active veneer mills in the North Central Region, 1974.*

Type of mill	Number	Name of mill	Location
		MINNESOTA	
Standard	1	Diamond International Co.[1/]	Cloquet
	2	Wahkon Veneer Mills	Wahkon
Container	3	Allen Wood Products, Inc.	Hopkins
	4	Elk River Box Co.	Elk River
		WISCONSIN	
Standard	5	Birchwood Lumber & Veneer Co.	Birchwood
	6	Birchwood Mfg. Co.	Rice Lake
	7	Louisiana-Pacific Corp.	Goodman
	8	Louisiana-Pacific Corp.	Mellen
	9	Eggers Plywood Co.	Two Rivers
	10	Gillett Veneer & Plywood Co.	Gillett
	11	Linwood, Inc.	Gillett
	12	Larson Plywood Co., Inc.	Sheboygan
	13	Hatley Veneer Co., Inc.	Hatley
	14	Marion Plywood Corp.	Marion
	15	Weber Veneer & Plywood Co.	Shawano
	16	Weyerhaeuser Co.	Marshfield
	17	Wisconsin Timber & Land Co.	Matoon
Container	18	Brunette Box & Veneer	Rice Lake
	19	Dufeck Mfg. Co.	Denmark
	20	Ebner Box Factory	Cameron
	21	Konz Container Co.	Howard Grove
	22	Seymour Woodenware Co.	Seymour
	23	Standard Container Co.	Edgar
		MICHIGAN	
Standard	24	Anthony & Co.	Escanaba
	25	Iron Wood Products	Bessemer
	26	Manthei Bros.	Petoskey
	27	Soo Hardwoods, Inc.	Sault Ste. Marie
Container	28	A. C. Hensel Mfg. Co.	Augusta
	29	Nelson R. Anderson Co.	Stevensville
	30	Fruit Growers Package Co.	Paw Paw
	31	Michigan Crate & Basket	Shelby
	32	Riverside Package Co.	Riverside
		IOWA	
Standard	33	R. S. Bacon Veneer Co.	Dubuque
	34	Iowa Veneers, Inc.	Spencer
		MISSOURI	
Standard	35	Vario Veneer Corp.	Pleasant Hill
	36	Missouri Valley Walnut Co.	St. Joseph
Container	37	Betz Tipton Veneer Co.	Caruthersville
	38	Crumbliss Wood Products	Neosho
		ILLINOIS	
Standard	39	Swords Veneer & Lumber Co.	Rock Island
Container	40	The Martin Bros. Container & Timber Products, Inc.	Karnak
		INDIANA	
Standard	41	Evansville Veneer Co.	Evansville
	42	Jasper Veneer Mills	Jasper
	43	Central Veneer, Inc.	Indianapolis
	44	Curry Miller Veneers, Inc.	Indianapolis
	45	Indiana Veneers, Inc.	Indianapolis
	46	David R. Webb Co.	Edinburg
	47	Amos Thompson Corp.	Edinburg
	48	Hill Bros. Veneer Co., Inc.	Edinburg
	49	B. L. Curry & Sons	New Albany
	50	Chester B. Stem, Inc.	New Albany
	51	Adams Custom Veneer Co.	New Albany
	52	National Veneer & Lumber Co.	Seymour
	53	Pierson-Holowell Co., Inc.	Lawrenceburg
	54	Roberts & Strack Veneer Co.	Clarksville
	55	Ford Sawmill Inc. (Veneer Div.)	Vincennes
	56	Theising Veneer Co., Inc.	Mooresville
Container	57	Farrell Box Co., Inc.	Decker
	58	New Albany Box & Basket Co., Inc.	New Albany

[1/] Receipts not recorded to avoid disclosure of operations at this mill.

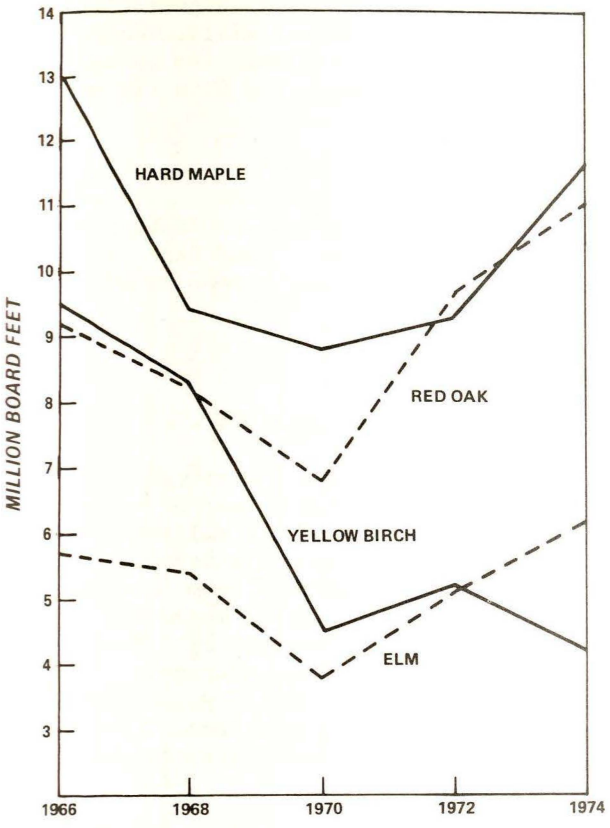

Figure 2.--*Veneer-log production of four major species for selected years, Lake States, 1966-1974.*

probably because the quantity of elm remaining in Michigan is small. Of the total cut, 39 percent was shipped to Wisconsin and 12 percent was shipped beyond the Lake States. Important species shipped out-of-State were hard maple, yellow birch, and red oak.

In Minnesota, 93 percent of the 5.4 million board feet of veneer logs cut was procured by out-of-State mills. Cottonwood, aspen, elm, and red oak were the dominant species cut.

Mill Receipts

Lake States veneer mills received 67.5 million board feet of logs in 1974 including imports of 4.1 million board feet. Imports from Canada fell 1 million board feet (33 percent) compared to 1972 while log receipts from other States (primarily Iowa) rose half a million board feet. Excluding aspen, major increases in demand over 1972 were for hard maple, soft maple, and red oak.

Nineteen Wisconsin veneer mills received 41.6 million board feet of logs, 5.1 million board feet more than in 1972. Red oak, hard maple, and elm were the primary species procured. One-fourth of the volume came from Michigan including more than half of the hard maple and yellow birch receipts.

Michigan's mills procured 25.3 million board feet of veneer logs. Imports from Canada were off 44 percent from 1972 and no other wood was purchased outside the Lake States.

Minnesota veneer plants received 0.6 million board feet of logs, up 17 percent from 1972.

Plant Residue[4]

More than 99 percent of the coarse residue generated at Lake States veneer mills in 1974 was used. On the other hand, 36 percent of the fine residue and 41 percent of the bark were not used. The primary use (69 percent) for coarse residue was in fiber products. Important uses for fine residue were industrial fuel (32 percent) and fiber products (28 percent). More than half (58 percent) the bark was used for industrial fuel. Disposal problems appear to be significant for fine residue and bark. The only problem with coarse residue disposal might be in finding higher value markets.

CENTRAL STATES

Production

Central States veneer-log production continued to rebound in 1974 from the low point in 1970 (fig. 3). The harvest was 29.1 million board feet, up 11 percent from 1972. Eighty-five percent (24.8 million board feet) was standard veneer logs, the remainder was used for container veneer.

[4]*Plant residue at veneer mills is classed as: (1) bark; (2) coarse (wood)--suitable for chipping, such as veneer cores; or (3) fine (wood)--not suitable for chipping, such as veneer clippings.*

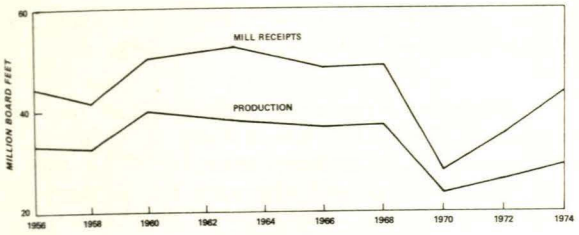

Figure 3.--*Veneer-log production and mill receipts in the Central States, 1956-1974.*

Principal species cut were:

Species	*Million board feet*
Walnut	8.5
White oak	5.2
Cottonwood	4.0
Red oak	2.9

Walnut and the oaks were used primarily in furniture and decorative paneling. Cottonwood was used chiefly for containers and pallets.

Important harvest changes between 1972 and 1974 were:

Species	*Thousand board feet*	*Percent*
White oak	+1,861	+56
Red oak	+1,217	+70
Walnut	-1,486	-15
Pecan (hickory)	-1,232	-51

Red oak and white oak harvests were the highest recorded in the last 2 decades.

Exports moved slightly higher (3 percent) than in 1972 to 5.5 million board feet; they were mainly to Kentucky (46 percent), Wisconsin (34 percent), and Ohio (13 percent).

Indiana loggers cut half of the Central States veneer log volume. Iowa edged out Illinois for second place in production after being 1.5 million board feet behind in 1972. Only Missouri cut a smaller volume of veneer logs than in 1972.

Mill Receipts

Twenty-six Central States mills received 39.7 million board feet of veneer logs in 1974, a rise of 4.7 million board feet from 1972. These mills imported 16.2 million board feet of logs from 20 other States and Canada including more than 1 million board feet from each of 6 States--Ohio, Kentucky, Oklahoma, Wisconsin, Michigan, and Pennsylvania. Major imports included black cherry from Pennsylvania, pecan from Oklahoma, and white oak from Ohio.

Indiana's 18 veneer mills procured 76 percent of the total log receipts in 1974 including 85 percent or more of the black cherry, hard maple, pecan, red oak, white oak, and yellow-poplar.

Plant Residue

Most wood residue (90 percent) was used so the only significant disposal problem may be in upgrading the uses. On the other hand, 30 percent of the bark was disposed of as waste, a significant increase from only 12 percent in 1972. Industrial fuel was the primary use for both wood and bark residue.

Table 1.--*Production and imports of veneer logs, Lake States, 1974*
(In thousand board feet, International 1/4-inch log rule)

SPECIES AND DESTINATION	PRODUCTION BY STATES 1/				IMPORTS			TOTAL RECEIPTS 2/
	MICHIGAN	MINNESOTA	WISCONSIN	REGIONAL TOTAL	OTHER U.S.	CANADA	TOTAL IMPORTS	
PINE								
EXPORTED 3/	0	0	10	10	0	0	0	0
TOTAL	0	0	10	10	0	0	0	0
OTHER SOFTWOODS								
WISCONSIN	0	0	60	60	0	0	0	60
TOTAL	0	0	60	60	0	0	0	60
ASH								
MICHIGAN	40	0	0	40	0	0	0	40
WISCONSIN	79	19	684	782	39	0	39	821
EXPORTED 3/	46	11	12	69	0	0	0	0
TOTAL	165	30	696	891	39	0	39	861
ASPEN								
MICHIGAN	9056	1060	11130	21246	0	42	42	21288
MINNESOTA	0	15	41	56	0	0	0	56
WISCONSIN	241	0	2674	2915	0	0	0	2915
EXPORTED 3/	0	43	0	43	0	0	0	0
TOTAL	9297	1118	13845	24260	0	42	42	24259
BASSWOOD								
MICHIGAN	367	0	0	367	0	5	5	372
MINNESOTA	0	189	0	189	0	0	0	189
WISCONSIN	133	399	1270	1802	223	0	223	2025
EXPORTED 3/	24	0	5	29	0	0	0	0
TOTAL	524	588	1275	2387	223	5	228	2586
BEECH								
MICHIGAN	120	0	0	120	0	0	0	120
WISCONSIN	390	0	30	420	0	0	0	420
EXPORTED 3/	200	0	0	200	0	0	0	0
TOTAL	710	0	30	740	0	0	0	540
BLACK CHERRY								
MICHIGAN	21	0	0	21	0	0	0	21
WISCONSIN	10	0	28	38	15	0	15	53
EXPORTED 3/	11	0	4	15	0	0	0	0
TOTAL	42	0	32	74	15	0	15	74

TABLE 1 CONTINUED ON NEXT PAGE

TABLE 1 CONTINUED

BUTTERNUT								
WISCONSIN	0	0	11	11	0	0	0	11
EXPORTED 3/	1	40	182	223	0	0	0	0
TOTAL	1	40	193	234	0	0	0	11
COTTONWOOD								
MICHIGAN	292	0	0	292	0	0	0	292
MINNESOTA	0	41	0	41	0	0	0	41
WISCONSIN	0	1081	190	1271	170	0	170	1441
EXPORTED 3/	0	0	173	173	0	0	0	0
TOTAL	292	1122	363	1777	170	0	170	1774
ELM								
MICHIGAN	19	0	0	19	0	0	0	19
MINNESOTA	0	15	0	15	0	0	0	15
WISCONSIN	260	597	4674	5531	112	0	112	5643
EXPORTED 3/	110	320	164	594	0	0	0	0
TOTAL	389	932	4838	6159	112	0	112	5677
GUM								
MICHIGAN	6	0	0	6	0	0	0	6
TOTAL	6	0	0	6	0	0	0	6
HARD MAPLE								
MICHIGAN	1148	0	0	1148	0	0	0	1148
MINNESOTA	0	107	0	107	0	0	0	107
WISCONSIN	5790	135	3530	9455	244	983	1227	10682
EXPORTED 3/	985	0	11	996	0	0	0	0
TOTAL	7923	242	3541	11706	244	983	1227	11937
PAPER BIRCH								
MICHIGAN	634	32	0	666	0	0	0	666
WISCONSIN	293	141	177	611	0	30	30	641
TOTAL	927	173	177	1277	0	30	30	1307
PECAN (HICKORY)								
WISCONSIN	0	0	0	0	1	0	1	1
EXPORTED 3/	30	0	2	32	0	0	0	0
TOTAL	30	0	2	32	1	0	1	1
RED OAK								
MICHIGAN	108	0	0	108	0	0	0	108
MINNESOTA	0	26	0	26	0	0	0	26
WISCONSIN	528	781	8705	10014	930	20	950	10964
EXPORTED 3/	456	0	503	959	0	0	0	0
TOTAL	1092	807	9208	11107	930	20	950	11098

TABLE 1 CONTINUED ON NEXT PAGE

SOFT MAPLE								
MICHIGAN	267	0	0	267	0	0	0	267
MINNESOTA	0	0	0	0	128	0	128	128
WISCONSIN	308	310	1131	1749	169	0	169	1918
TOTAL	575	310	1131	2016	297	0	297	2313
SYCAMORE								
MICHIGAN	28	0	0	28	0	0	0	28
TOTAL	28	0	0	28	0	0	0	28
WALNUT								
EXPORTED 3/	264	17	690	971	0	0	0	0
TOTAL	264	17	690	971	0	0	0	0
WHITE OAK								
MICHIGAN	6	0	0	6	0	0	0	6
WISCONSIN	2	3	66	71	1	0	1	72
EXPORTED 3/	362	7	115	484	0	0	0	0
TOTAL	370	10	181	561	1	0	1	78
YELLOW BIRCH								
MICHIGAN	449	0	6	455	0	323	323	778
WISCONSIN	2183	20	999	3202	0	666	666	3868
EXPORTED 3/	515	0	0	515	0	0	0	0
TOTAL	3147	20	1005	4172	0	989	989	4646
YELLOW-POPLAR								
MICHIGAN	163	0	0	163	0	0	0	163
WISCONSIN	0	0	64	64	0	0	0	64
TOTAL	163	0	64	227	0	0	0	227
OTHER HARDWOODS								
WISCONSIN	4	0	1	5	1	0	1	6
EXPORTED 3/	0	1	0	1	0	0	0	0
TOTAL	4	1	1	6	1	0	1	6
ALL SPECIES								
MICHIGAN	12724	1092	11136	24952	0	370	370	25322
MINNESOTA	0	393	41	434	128	0	128	562
WISCONSIN	10221	3486	24294	38001	1905	1699	3604	41605
EXPORTED 3/	3004	439	1871	5314	0	0	0	0
TOTAL	25949	5410	37342	68701	2033	2069	4102	67489

1/ VERTICAL COLUMNS OF FIGURES UNDER BOX HEADING PRODUCTION BY STATES PRESENT THE AMOUNT OF VENEER LOGS CUT IN EACH STATE.

2/ PRODUCTION MINUS EXPORTS PLUS IMPORTS.

3/ VENEER LOGS SHIPPED TO STATES OUTSIDE THE LAKE STATES AND TO CANADA.

Table 2.--*Mills using five species of Lake States veneer logs, by location, 1974*
(In numbers)

Location	Red oak	Hard maple	Yellow birch	Elm	Aspen
Lake States	15	17	11	17	16
Indiana	5	7	--	2	--
Illinois	1	--	--	1	--
Iowa	2	1	--	2	--
Ohio	--	2	--	--	--
Kentucky	1	1	--	1	--
Canada	1	1	1	1	1
Total	25	29	12	24	17

Table 3.--*Veneer-log production and receipts in the Lake States by species, 1972 and 1974*
(In thousand board feet, International 1/4-inch log rule)

Species	Production			Receipts		
	1972	1974	change	1972	1974	change
Ash	603	891	+288	629	861	+232
Aspen	1/	1/	1/	1/	1/	1/
Basswood	2873	2387	-486	3100	2586	-514
Beech	1065	740	-325	748	540	-208
Black cherry	151	74	-77	128	74	-54
Butternut	346	234	-112	2	11	+9
Cottonwood	1268	1777	+509	1276	1774	+498
Elm	5098	6159	+1061	5255	5677	+422
Hard maple	9255	11706	+2451	9421	11937	+2516
Paper birch	1223	1277	+54	1457	1307	-150
Pecan (hickory)	86	32	-54	4	1	-3
Red oak	9703	11107	+1404	10089	11098	+1009
Soft maple	1040	2016	+976	1185	2313	+1128
Walnut	1376	971	-405	--	--	--
White oak	287	561	+274	202	78	-124
Yellow birch	5187	4172	-1015	6349	4646	-1703
Other species	57	337	+280	49	327	+278
Total	39618	44441	+4823	39894	43230	+3336

1/ Comparison was not meaninfgul because log production and receipts for one veneer mill were included in 1974 but not in previous years.

Table 4.--*Veneer-log production by species group for selected years, Lake States, 1946-1974*
(In million board feet, International 1/4-inch log rule)

Year	Ash	Aspen	Bass-wood	Beech	Yellow birch	Cotton-wood	Elm	Hard maple	Soft maple	Red oak	White oak	Paper birch	Walnut	Other species	All species
1946	2.3	4.0	10.4	5.6	1/26.8	0.4	16.6	2/40.3	--	3/3.1	--	--	--	1.1	110.6
1952	--	1.4	10.4	3.1	1/18.2	--	11.5	2/23.8	--	3/5.1	--	--	--	4/4.7	78.2
1954	.8	.3	9.2	3.2	1/17.3	2.7	10.5	2/20.9	--	3/5.5	--	--	--	1.6	72.0
1956	.7	.8	10.3	5.7	1/20.3	2.1	9.6	20.1	3.7	3/4.5	--	--	.3	.9	79.0
1958	.6	1.7	7.1	1.8	1/13.1	2.2	8.9	9.7	2.2	3/4.8	--	--	.2	.4	52.7
1960	1.0	2.1	6.2	1.0	1/14.1	1.9	5.1	10.9	2.9	3/7.6	--	--	.6	.6	54.0
1963	.6	1.5	6.6	.3	1/10.9	.4	5.7	10.5	2.2	3/8.9	--	--	2.3	.6	50.5
1965	.7	.6	6.0	.5	1/11.3	1.4	6.3	11.8	1.8	3/9.0	--	--	.9	1.4	51.7
1966	1.1	.7	4.5	.5	1/ 9.5	1.4	5.7	13.1	1.5	9.1	.3	--	1.5	2.0	50.9
1968	1.0	.6	3.6	.5	8.3	1.4	5.4	9.4	1.2	8.2	.5	1.9	1.7	1.8	45.5
1970	.4	1.3	3.2	.3	4.4	1.3	3.8	8.8	.8	6.8	.3	1.2	.6	1.2	34.4
1972	.6	2.6	2.9	1.1	5.2	1.3	5.1	9.2	1.0	9.7	.3	1.2	1.4	.6	42.2
1974	.9	24.2	2.4	.7	4.2	1.8	6.1	11.7	2.0	11.1	.6	1.3	1.0	.7	68.7

1/ Includes paper birch.
2/ Includes soft maple.
3/ Includes white oak.
4/ Includes ash and cottonwood.

Table 5.--*Veneer-log production for selected years and type of industry, Lake States, 1946-1974*
(In million board feet, International 1/4-inch log rule)

Year	Standard	Container	Total
1946	72.7	37.9	110.6
1948	71.7	45.1	116.8
1950	47.3	39.3	86.6
1952	46.8	31.4	78.2
1954	45.3	26.7	72.0
1956	51.6	27.4	79.0
1958	40.3	12.4	52.7
1960	46.5	7.5	54.0
1962	41.0	6.6	47.6
1963	43.9	6.6	50.5
1965	44.6	7.1	51.7
1966	45.0	5.9	50.9
1968	40.6	4.9	45.5
1970	29.4	5.0	34.4
1972	38.0	4.2	42.2
1974	64.1	4.6	68.7

Table 6.--*Lake States veneer-log production, receipts, exports, and imports for selected years, 1946-1972*
(In million board feet, International 1/4-inch log rule)

Year	Produced in the Lake States and received at Lake States Mills	Exported[1/]	Imported[2/]	Total production in Lake States	Total receipts in Lake States
1946	109.7	0.9	5.9	110.6	115.6
1948	116.0	.8	12.0	116.8	128.0
1950	86.0	.6	15.7	86.6	101.7
1952	77.8	.4	12.1	78.2	89.9
1954	71.6	.4	12.1	72.0	83.7
1956	78.7	.3	13.4	79.0	92.1
1958	51.5	1.2	6.0	52.7	57.5
1960	51.9	2.1	12.5	54.0	64.4
1963	45.0	5.5	7.7	50.5	52.7
1965	49.0	2.7	7.6	51.7	56.6
1966	45.8	5.1	9.6	50.9	55.4
1968	39.7	5.8	7.9	45.5	47.6
1970	31.4	3.0	5.6	34.4	37.0
1972	37.7	4.5	4.6	42.2	42.3
1974	63.4	5.3	4.1	68.7	67.5

1/ From Lakes States to other States and Canada.
2/ From other States and Canada into Lakes States.

Table 7.--*Veneer-log receipts in the Lake States by species groups for selected years, 1952-1974*

Year	Ash	Aspen	Bass-wood	Beech	Yellow birch	Cotton-wood	Elm	Hard maple	Soft maple	Red oak	White oak	Paper birch	Other species	All species
1952	—	1.4	10.9	3.2	1/27.1	--	11.7	2/24.9	--	3/5.3	--	--	4/5.4	89.9
1954	.8	.3	10.3	3.2	1/25.0	2.7	10.9	2/22.4	--	3/6.5	--	--	1.6	83.7
1956	.7	.8	10.6	5.7	1/28.5	3.0	10.2	21.9	4.7	3/5.0	--	--	1.0	92.1
1958	.6	1.7	7.3	1.8	1/17.2	2.2	9.2	9.6	2.5	3/5.0	--	--	.4	57.5
1960	1.1	2.1	6.8	.9	1/18.9	3.3	6.2	12.2	3.6	3/8.4	--	--	.9	64.4
1963	.7	1.6	6.7	.3	1/14.3	.7	4.9	11.1	2.6	3/9.3	--	--	.5	52.7
1965	.7	.6	6.3	.5	1/14.5	2.1	6.3	13.2	1.9	3/9.3	--	--	1.2	56.6
1966	1.1	.7	4.8	.5	1/14.7	2.3	5.8	12.8	1.8	9.7	.2	--	1.0	55.4
1968	1.0	.6	3.9	.5	10.2	2.1	5.2	9.0	1.3	8.3	.2	4.0	1.3	47.6
1970	.3	1.3	3.6	.3	6.1	1.4	3.8	9.0	.9	7.7	.2	1.9	.5	37.0
1972	.6	2.4	3.1	.7	6.3	1.3	5.3	9.4	1.2	10.1	.2	1.5	.2	42.3
1974	.9	24.3	2.6	.5	4.6	1.8	5.7	11.9	2.3	11.1	.1	1.3	.4	67.5

1/ Includes paper birch.
2/ Includes soft maple.
3/ Includes white oak.
4/ Includes ash and cottonwood.

Table 8.--*Production and disposition of hardwood veneer plant residue by type of residue and use, Lake States, 1974*
(In thousand cubic feet)

State and type of use	Wood residue			Bark
	Total	Coarse 1/	Fine 2/	
Michigan				
Fiber products	625.6	625.6	--	--
Industrial fuel	166.6	23.2	143.4	144.1
Domestic fuel	16.0	16.0	--	--
Miscellaneous 3/	38.9	38.9	--	16.8
Not used 4/	1001.6	5.4	996.2	624.0
Total	1848.7	709.1	1139.6	784.9
Minnesota				
Industrial fuel	5.1	2.4	2.7	3.4
Domestic fuel	10.3	9.8	.5	8.0
Miscellaneous 3/	8.0	3.6	4.4	--
Not used 4/	17.7	--	17.7	6.1
Total	41.1	15.8	25.3	17.5
Wisconsin				
Fiber products	1531.3	685.2	846.1	--
Industrial fuel	1017.7	190.3	827.4	1060.3
Domestic fuel	23.5	23.5	--	--
Miscellaneous 3/	385.5	256.1	129.4	4.5
Not used 4/	74.8	8.4	66.4	223.1
Total	3032.8	1163.5	1869.3	1287.9
All Lake States				
Fiber products	2156.9	1310.8	846.1	--
Industrial fuel	1189.4	215.9	973.5	1207.8
Domestic fuel	49.8	49.3	.5	8.0
Miscellaneous 3/	432.4	298.6	133.8	21.3
Not used 4/	1094.1	13.8	1080.3	853.2
Total	4922.6	1888.4	3034.2	2090.3

1/ Suitable for chipping such as veneer cores.
2/ Not suitable for chipping such as veneer clippings.
3/ Livestock bedding, mulch, small dimension and specialty items.
4/ Including residues burned as waste.

Table 9.--*Production and imports of veneer logs, Central States, 1974*
(In thousand board feet, International 1/4-inch log rule)

SPECIES AND DESTINATION	PROUCTION BY STATES 1/					IMPORTS			TOTAL RECEIPTS 2/
	ILLINOIS	INDIANA	IOWA	MISSOURI	REGIONAL TOTAL	LAKE STATES	OTHER U.S.	TOTAL IMPORTS	
PINE									
INDIANA	0	0	0	0	0	0	12	12	12
ILL.,IOWA,MO.	0	0	14	0	14	10	0	10	24
TOTAL	0	0	14	0	14	10	12	22	36
ASH									
INDIANA	29	389	0	0	418	1	250	251	669
ILL.,IOWA,MO.	32	15	151	16	214	27	34	61	275
EXPORTED 3/	0	81	39	0	120	0	0	0	0
TOTAL	61	485	190	16	752	28	284	312	944
BASSWOOD									
INDIANA	0	6	0	0	6	24	0	24	30
ILL.,IOWA,MO.	0	0	34	0	34	5	0	5	39
EXPORTED 3/	0	0	223	0	223	0	0	0	0
TOTAL	0	6	257	0	263	29	0	29	69
BLACK CHERRY									
INDIANA	0	161	0	0	161	11	611	622	783
ILL.,IOWA,MO.	0	0	22	0	22	4	0	4	26
EXPORTED 3/	0	0	15	0	15	0	0	0	0
TOTAL	0	161	37	0	198	15	611	626	809
BUTTERNUT									
INDIANA	0	19	4	0	23	220	2	222	245
ILL.,IOWA,MO.	0	0	26	0	26	3	0	3	29
TOTAL	0	19	30	0	49	223	2	225	274
COTTONWOOD									
INDIANA	352	2029	0	0	2381	173	18	191	2572
ILL.,IOWA,MO.	856	0	4	550	1410	0	1633	1633	3043
EXPORTED 3/	0	0	165	0	165	0	0	0	0
TOTAL	1208	2029	169	550	3956	173	1651	1824	5615
ELM									
INDIANA	0	32	0	0	32	72	10	82	114
ILL.,IOWA,MO.	277	2	193	0	472	92	36	128	600
EXPORTED 3/	0	0	157	3	160	0	0	0	0
TOTAL	277	34	350	3	664	164	46	210	714

TABLE 9 CONTINUED ON NEXT PAGE

TABLE 9 CONTINUED

GUM									
INDIANA	43	302	0	0	345	0	71	71	416
ILL.,IOWA,MO.	651	0	0	0	651	0	3	3	654
EXPORTED 3/	4	0	0	4	8	0	0	0	0
TOTAL	698	302	0	4	1004	0	74	74	1070
HARD MAPLE									
INDIANA	1	603	0	0	604	347	4/ 284	631	1235
ILL.,IOWA,MO.	0	0	46	0	46	11	0	11	57
EXPORTED 3/	0	220	248	0	468	0	0	0	0
TOTAL	1	823	294	0	1118	358	284	642	1292
PAPER BIRCH									
INDIANA	0	0	0	0	0	0	5/ 27	27	27
TOTAL	0	0	0	0	0	0	27	27	27
PECAN (HICKORY)									
INDIANA	63	414	0	118	595	30	2549	2579	3174
ILL.,IOWA,MO.	19	0	345	74	438	2	4	6	444
EXPORTED 3/	0	102	1	30	133	0	0	0	0
TOTAL	82	516	346	222	1166	32	2553	2585	3618
RED OAK									
INDIANA	22	1167	0	0	1189	624	1430	2054	3243
ILL.,IOWA,MO.	20	0	505	1	526	54	5	59	585
EXPORTED 3/	51	217	948	13	1229	0	0	0	0
TOTAL	93	1384	1453	14	2944	678	1435	2113	3828
SOFT MAPLE									
INDIANA	25	219	0	0	244	0	17	17	261
ILL.,IOWA,MO.	90	0	0	0	90	0	319	319	409
EXPORTED 3/	0	0	297	1	298	0	0	0	0
TOTAL	115	219	297	1	632	0	336	336	670
SYCAMORE									
INDIANA	20	675	0	0	695	0	57	57	752
ILL.,IOWA,MO.	150	0	0	33	183	0	91	91	274
EXPORTED 3/	0	0	0	19	19	0	0	0	0
TOTAL	170	675	0	52	897	0	148	148	1026
WALNUT									
INDIANA	1081	2217	1010	633	4941	572	2092	2664	7605
ILL.,IOWA,MO.	395	13	1002	379	1789	280	433	713	2502
EXPORTED 3/	126	1013	0	649	1788	0	0	0	0
TOTAL	1602	3243	2012	1661	8518	852	2525	3377	10107

TABLE 9 CONTINUED ON NEXT PAGE

TABLE 9 CONTINUED

WHITE OAK									
INDIANA	904	2885	67	113	3969	207	6/3032	3239	7208
ILL.,IOWA,MO.	89	26	153	107	375	13	83	96	471
EXPORTED 3/	125	588	59	59	831	0	0	0	0
TOTAL	1118	3499	279	279	5175	220	3115	3335	7679
YELLOW BIRCH									
INDIANA	1	9	0	0	10	0	21	21	31
TOTAL	1	9	0	0	10	0	21	21	31
YELLOW-POPLAR									
INDIANA	15	1194	0	0	1209	0	58	58	1267
ILL.,IOWA,MO.	0	0	1	0	1	0	0	0	1
EXPORTED 3/	0	14	0	1	15	0	0	0	0
TOTAL	15	1208	1	1	1225	0	58	58	1268
OTHER HARDWOODS									
INDIANA	165	127	0	57	349	0	177	177	526
ILL.,IOWA,MO.	14	0	0	64	78	0	50	50	128
EXPORTED 3/	0	51	1	0	52	0	0	0	0
TOTAL	179	178	1	121	479	0	227	227	654
ALL SPECIES									
INDIANA	2721	12448	1081	921	17171	2281	10718	12999	30170
ILL.,IOWA,MO.	2593	56	2496	1224	6369	501	2691	3192	9561
EXPORTED 3/	306	2286	2153	779	5524	0	0	0	0
TOTAL	5620	14790	5730	2924	29064	2782	13409	16191	39731

1/ VERTICAL COLUMNS OF FIGURES UNDER BOX HEADING PRODUCTION BY STATES PRESENT THE AMOUNT OF VENEER LOGS CUT IN EACH STATE.

2/ PRODUCTION MINUS EXPORTS PLUS IMPORTS.

3/ VENEER LOGS SHIPPED TO STATES OUTSIDE THE CENTRAL STATES AND TO CANADA.

4/ INCLUDES 111 THOUSAND BOARD FEET FROM CANADA.

5/ FROM CANADA.

6/ INCLUDES 22 THOUSAND BOARD FEET FROM CANADA.

Table 10.--*Veneer-log production and receipts in the Central States by species, 1972 and 1974*
(In thousand board feet, International 1/4-inch log rule)

Species	Production			Receipts		
	1972	1974	Change	1972	1974	Change
Ash	392	752	+ 360	542	944	+ 402
Basswood	263	263	--	36	69	+ 33
Black cherry	86	198	+ 112	855	809	- 46
Butternut	43	49	+ 6	381	274	- 107
Cottonwood	3478	3956	+ 478	4855	5615	+ 760
Elm	495	664	+ 169	342	714	+ 372
Gum	490	1004	+ 514	606	1070	+ 464
Hard maple	1136	1118	- 18	2425	1292	-1133
Pecan (hickory)	2398	1166	-1232	5690	3618	-2072
Red oak	1727	2944	+1217	1569	3828	+2259
Soft maple	445	632	+ 187	515	670	+ 155
Sycamore	682	897	+ 215	854	1026	+ 172
Walnut	10004	8518	-1486	10984	10107	- 877
White oak	3314	5175	+1861	4034	7679	+3645
Yellow-poplar	1150	1225	+ 75	1231	1268	+ 37
Other species	109	503	+ 394	137	748	+ 611
Total	26212	29064	+2852	35056	39731	+4675

Table 11.--*Veneer-log production by species groups for selected years, Central States, 1956-1974*
(In million board feet, International 1/4-inch log rule)

Year	Cotton-wood	Elm	Hard maple	Pecan (hickory)	Red oak	Soft maple	Sycamore	Walnut	White oak	Yellow-poplar	Other species	All species
1956	8.0	0.9	0.8	0.1	1.1	1.8	0.6	10.6	3.4	1.6	4.2	33.1
1958	8.9	.6	1.1	.1	1.0	.5	.5	10.8	2.6	1.1	5.2	32.4
1960	11.2	2.0	1.2	.1	1.5	1.2	2.5	13.2	1.6	1.6	3.8	39.9
1963	7.4	.7	1.6	.8	.9	1.0	1.8	15.5	1.4	2.3	4.6	38.0
1966	6.2	1/.7	1.4	1.1	2.3	.5	1.0	14.7	1.9	3.0	3.9	36.7
1968	4.1	.7	1.3	3.0	2.1	.4	1.2	16.1	3.6	1.3	3.2	37.0
1970	4.8	.6	.8	1.5	1.3	.5	1.3	8.1	1.7	.8	2.1	23.5
1972	3.5	.5	1.1	2.4	1.7	.4	.7	10.0	3.3	1.2	1.4	26.2
1974	4.0	.7	1.1	1.2	2.9	.6	.9	8.5	5.2	1.2	2.8	29.1

1/ Estimated.

Table 12.--*Veneer-log receipts by species groups for selected years, Central States, 1956-1974*
(In million board feet, International 1/4-inch log rule)

Year	Cotton-wood	Elm	Hard maple	Pecan (hickory)	Red oak	Soft maple	Sycamore	Walnut	White oak	Yellow-poplar	Other species	All species
1956	10.9	0.8	1.2	0.6	1.3	0.8	1.3	11.4	6.7	2.8	6.6	44.4
1958	10.2	.6	1.7	.3	1.3	.3	1.2	13.0	4.8	1.9	6.3	41.6
1960	10.4	1.0	2.9	.2	1.4	.5	2.3	17.1	3.6	2.8	8.0	50.2
1963	8.6	1.0	3.1	1.6	.9	.8	2.0	21.2	2.3	2.8	7.9	52.2
1966	6.7	1/1.0	3.6	1.6	2.0	.4	1.2	17.9	2.1	4.4	7.3	48.2
1968	5.7	1.0	2.7	4.9	2.3	.5	1.1	18.4	5.2	1.9	5.1	48.8
1970	4.7	.5	1.3	3.0	.8	.6	1.4	10.0	2.0	1.1	2.6	28.0
1972	4.9	.3	2.4	5.7	1.6	.5	.9	11.0	4.0	1.2	2.6	35.1
1974	5.6	.7	1.3	3.6	3.8	.7	1.0	10.1	7.7	1.3	3.9	39.7

1/ Estimated.

Table 13.--*Production and disposition of hardwood veneer plant residue by type of residue and use, Central States, 1974*
(In thousand cubic feet)

State and type of use	Wood residue			Bark
	Total	Coarse 1/	Fine 2/	
Illinois, Iowa and Missouri				
Fiber products	63.2	63.2	--	--
Industrial fuel	315.4	62.9	252.5	49.8
Domestic fuel	5.9	5.9	--	1.6
Miscellaneous 3/	28.3	28.3	--	--
Not used 4/	283.7	107.0	176.7	244.1
Total	696.5	267.3	429.2	295.5
Indiana				
Fiber products	337.5	141.4	196.1	--
Industrial fuel	1446.1	395.9	1050.2	723.3
Domestic fuel	33.6	18.7	14.9	--
Miscellaneous 3/	364.7	272.9	91.8	83.0
Not used 4/	19.8	15.5	4.3	128.6
Total	2201.7	844.4	1357.3	934.9
All Central States				
Fiber products	400.7	204.6	196.1	--
Industrial fuel	1761.5	458.8	1302.7	773.1
Domestic fuel	39.5	24.6	14.9	1.6
Miscellaneous 3/	393.0	301.2	91.8	83.0
Not used 4/	303.5	122.5	181.0	372.7
Total	2898.2	1111.7	1786.5	1230.4

1/ Suitable for chipping, such as veneer cores.
2/ Not suitable for chipping, such as veneer clippings.
3/ Livestock bedding, mulch, small dimension and specialty items.
4/ Including residues burned as waste.

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OXFORD: 832.20:792(77). KEY WORDS: imports, exports, wood residue, bark, veneer mills.

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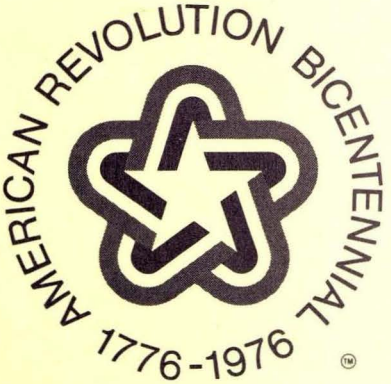
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